identified, first in chickens (Miyamato, US Patent no. 4,540,513) and subsequently in humans (White et al., Proc. Natl. Acad. Sci. USA 95 305-309, 1998). This peptide has been called GnRH-II. The sequences of the two peptides (SEQ ID NOS 5 & 6, respectively)

We have now found that GnRH-II is capable of modulating the differentiation of bone precursor cells and inducing the expansion of osteoblast populations. Accordingly, it is an object of the present invention to provide a pharmaceutical composition for the treatment of osteoporosis, which composition is characterized by the inclusion of GnRH-II or an analogue thereof. More specifically, the composition includes a peptide according to the sequence. (SEQ ID NO: 7)

B2

Please replace the paragraph beginning on page 3 at line 20 with the following rewritten paragraph:

In the first embodiment, the invention as disclosed herein comprises a pharmaceutical composition for increasing bone mass or bone density, or for accelerating bone growth or repair. Preferably, the invention as disclosed herein comprises a pharmaceutical composition for the treatment of osteoporosis (including age-related osteoporosis and osteoporosis associated with post-menopausal hormone status, primary and secondary hyperparathyroidism, disuse osteoporosis, diabetes-related osteoporosis, and glucocorticoid-related osteoporosis). The composition is characterized in that it includes as an active principal a peptide according to the sequence (SEQ ID NO: 7).

B3

Please replace the paragraphs beginning on page 5 at line 1 and 17 with the following rewritten paragraphs, respectively:

In a second embodiment, the invention disclosed herein comprises a method for the preparation of a pharmaceutical composition for the treatment of osteoporosis (including age-related osteoporosis and osteoporosis associated with post-menopausal hormone status, primary and secondary hyperparathyroidism, disuse osteoporosis, diabetes-related osteoporosis, and glucocorticoid-related osteoporosis) or another disorder, which method comprises the mixing of a peptide according to the sequence (SEQ ID NO: 7).

B4

In the third embodiment, the invention as disclosed herein comprises a method for the treatment of an individual suffering from osteoporosis (including age-related osteoporosis and osteoporosis associated with post-menopausal hormone status, primary and secondary hyperparathyroidism, disuse osteoporosis, diabetes-related osteoporosis, and glucocorticoid-related osteoporosis) or another bone disorder, or considered to be at risk of so suffering. This method of treatment comprises the administration to said individual of a therapeutically effective amount of a composition containing, as an active principal, a peptide according to the sequence (SEQ ID NO: 7).

B5

Please replace the paragraph beginning on page 8 at line 7 with the following rewritten paragraph:

B6 1A. Preparation of resin-bound protected peptide (SEQ ID NO: 8).

Please replace the paragraph beginning on page 9 at line 22, with the following rewritten paragraph:

B7 1B. Cleavage and deprotection (SEQ ID NO: 6).

Please replace the paragraph beginning on page 12 at line 31 with the following rewritten paragraph:

B8 Expression of GnRH-I and GnRH-II was determined by RT-PCR using PCR primers outlined in SEQ ID NOS 1-4. The integrity of the cDNA generated was determined by assessing the relative level of actin amplification.

After page 16, insert the printed Sequence Listing.

IN THE CLAIMS:

Please amend claims 1, 3, 5, 7, 8, 10, 11 and 12 as follows:

B10 1. (Once Amended) A pharmaceutical composition for the treatment of osteoporosis, including age-related osteoporosis and osteoporosis associated with post-menopausal hormone